

In the claims:

Cancel claims 2, 3 and 9 without prejudice.

Amend the following claims:

1. Piezoelectric actuator having a piezoelectric element (2; 21) for actuating a mechanical component with a pulling or pushing force, and a compensating element (3; 22), wherein the piezoelectric element (2) and the compensating element (3; 22) basically have the same temperature expansion coefficients, and wherein the compensating element (3; 22) is mechanically coupled to the piezoelectric element (2; 21) in such a fashion that the temperature-induced expansions of the piezoelectric element (2; 21) and the compensating element (3; 22) cancel each other out in the effective direction in such a fashion that the actuating element remains in the position, and wherein a heat transfer compound (12) is located between the piezoelectric element (2; 21) and the compensating element (3; 22).

4. Piezoelectric actuator to claim [3] 10, characterized in that the pretensioning spring (6) and the piezoelectric element (2) are located in tandem.

6. Piezoelectric actuator according to claim [8] 10,
characterized in that the pretensioning spring (23) and the piezoelectric
element (21) are situated parallel to each other.

7. Piezoelectric actuator according to [claims] claim 10,
characterized in that the pretensioning spring is formed out of at least one
zigzag spring (6; 23).

8. Piezoelectric actuator according to [claims] claim 1,
characterized in that the piezoelectric element (2; 21) is composed of a
multilayer structure of the transversely arranged, ceramic piezoelectric plies
that become longer in the effective direction when an external electric
voltage is applied, and the compensating element (3; 22) is made of ceramic.

Amended claims:

1. Piezoelectric actuator having a piezoelectric element (2; 21) for actuating a mechanical component with a pulling or pushing force, and a compensating element (3; 22), wherein the piezoelectric element (2) and the compensating element (3; 22) basically have the same temperature expansion coefficients, and wherein the compensating element (3; 22) is mechanically coupled to the piezoelectric element (2; 21) in such a fashion that the temperature-induced expansions of the piezoelectric element (2; 21) and the compensating element (3; 22) cancel each other out in the effective direction in such a fashion that the actuating element remains in the position, and wherein a heat transfer compound (12) is located between the piezoelectric element (2; 21) and the compensating element (3; 22).

4. Piezoelectric actuator to claim 10, characterized in that the pretensioning spring (6) and the piezoelectric element (2) are located in tandem.

6. Piezoelectric actuator according to claim 10, characterized in that the pretensioning spring (23) and the piezoelectric element (21) are situated parallel to each other.

7. Piezoelectric actuator according to claim 10, characterized in that the pretensioning spring is formed out of at least one zigzag spring (6; 23).

8. Piezoelectric actuator according to claim 1, characterized in that the piezoelectric element (2; 21) is composed of a multilayer structure of the transversely arranged, ceramic piezoelectric plies that become longer in the effective direction when an external electric voltage is applied, and the compensating element (3; 22) is made of ceramic.

Add the following claims:

10. Piezoelectric actuator having a piezoelectric element (2; 21) for actuating a mechanical component with a pulling or pushing force, and a compensating element (3; 22), wherein the piezoelectric element (2) and the compensating element (3; 22) basically have the same temperature expansion coefficients, and wherein the compensating element (3; 22) is mechanically coupled to the piezoelectric element (2; 21) in such a fashion that the temperature-induced expansions of the piezoelectric element (2; 21) and the compensating element (3; 22) cancel each other out in the effective direction in such a fashion that the actuating element remains in the position, and wherein the piezoelectric element (2; 21) is supported on one end on a fixed support plate (9), which fixed support plate (9) bears against the housing (7) for the piezoelectric actuator (1; 20) via a spring (10) and which is connected at the other end to a pretensioning spring (6; 23), in turn, is held against the fixed support plate (9) with its other end, and that the compensating element (3; 22) basically lies parallel to the piezoelectric element (2; 21) and is also held against the fixed support plate (9) with one end and solidly abuts the housing (7) with the other end.

11. Piezoelectric actuator having a piezoelectric element (2;

21) for actuating a mechanical component with a pulling or pushing force, and a compensating element (3; 22), wherein the piezoelectric element (2) and the compensating element (3; 22) basically have the same temperature expansion coefficients, and wherein the compensating element (3; 22) is mechanically coupled to the piezoelectric element (2; 21) in such a fashion that the temperature-induced expansions of the piezoelectric element (2; 21) and the compensating element (3; 22) cancel each other out in the effective direction in such a fashion that the actuating element remains in the position, and wherein the piezoelectric element (2, 21) is composed of a multilayer structure of transversely arranged, ceramic piezoelectric plies that become longer in the effective direction when an external electric voltage is applied, and that the compensating element (3; 22) is composed of piezoelectric plies arranged in the longitudinal direction that become shorter in the effective direction when an external electric voltage is applied.